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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/527,659	04/08/2005	Dirk Heukelbach	05587-00377-US	7080

23416 7590 09/12/2007
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EXAMINER	
NUTTER, NATHAN M	

ART UNIT	PAPER NUMBER
1711	

MAIL DATE	DELIVERY MODE
09/12/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/527,659	HEUKELBACH ET AL.	
	Examiner	Art Unit	
	Nathan M. Nutter	1711	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☐ Responsive to communication(s) filed on _____.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) 1-18 is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) 1-18 is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☒ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date 03-05.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Claim Objections

Claim 5 is objected to because of the following informalities: The claim recites only "formulae I, II, II', III, IV, V or...." The recitation reference to formula VI, as recited in claim 16, is missing. For the sake of compact prosecution, this typographical error will be overlooked, though applicants are required to make corrections in the Response to this Action. Appropriate correction is required.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claim 17 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The recitation of "where appropriate" renders the claim as vague and confusing. Nothing is recited nor indicated as to "where appropriate" clearly is inferred. ilt is unclear whether the limitation following the phrase are part of the claimed invention. See MPEP § 2173.05(d).

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application

> by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) and the Intellectual Property and High Technology Technical Amendments Act of 2002 do not apply when the reference is a U.S. patent resulting directly or indirectly from an international application filed before November 29, 2000. Therefore, the prior art date of the reference is determined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

Claims 1-3, 5-9, 13, 14, 16 and 17 are rejected under 35 U.S.C. 102(e) as anticipated by Jacobs et al (US 6,365,686), newly cited.

The patent to Jacobs et al teaches the production of a cyclic olefin copolymer (COC) that may be employed to produce films or sheets "of any shape and size" by injection molding techniques that possess "high barrier action against water vapor," as herein recited. Note column 25 (lines 43-50). At column 1 (lines 12-19), the reference teaches the preparation of cycloolefin copolymers having a high cycloolefin content, that possess a high glass transition temperature, "associated with a high heat distortion resistance." Further, note column 24 (lines 46-51) for Tg values that embrace those recited herein (claims 7 and 17). The reference employs "an amount in the range from 5 to 100% by weight, based on the total weight of polyolefins, of COC with a glass transition temperature Tg in the range from 65 to 200°C, " as pointed out above. The patent teaches the identical monomers (claims 5, 6 and 16) employed at column 22 (line 25) to column 23 (line 53) in identically disclosed amounts as recited herein. The

average molecular weight is shown at column 24 (lines 59-63) and embraces the range recited in claims 2 and 13. The reference teaches the range of viscosity numbers to be "from 10 to 1000 ml/g," shown at column 24 (lines 64-67) which is entirely within that recited in claims 3 and 14. Other polymers, including polyethylene, polypropylene and other olefin (co)polymers, are shown at column 26 (lines 9-27), as recited in claim 8.

Since the compositions produced in accordance with Jacobs et al, and subsequently employed in the manufacture of films of "any shape and size" by thermoforming, are identical as to monomers, content thereof, comonomers and their contents, having high water vapor resistance and embracing glass transition temperature values, the recitations regarding the temperature of thermoforming and the particular heat distortion temperature range would be inherent.

Claims 1-3, 5-9, 13, 14, 16 and 17 are rejected under 35 U.S.C. 102(e) as anticipated by Jacobs et al (US 6,316,560), newly cited.

The patent to Jacobs et al teaches the production of a cyclic olefin copolymer (COC) that may be employed to produce films or sheets "of any shape and size" by injection molding techniques that possess "high barrier action against water vapor," as herein recited. Note column 13 (lines 37-45). At column 1 (lines 17-24), the reference teaches the preparation of cycloolefin copolymers having a high cycloolefin content, that possess a high glass transition temperature, "associated with a high heat distortion resistance." Further, note column 11 (lines 36-40) for Tg values that embrace those recited herein (claims 7 and 17). The reference employs "an amount in the range from 5

to 100% by weight, based on the total weight of polyolefins, of COC with a glass transition temperature Tg in the range from 65 to 200°C, " as pointed out above. The patent teaches the identical monomers (claims 5, 6 and 16) employed at column 9 (line 29) to column 10 (line 50) in identically disclosed amounts as recited herein. The average molecular weight is shown at column 11 (lines 48-52) and embraces the range recited in claims 2 and 13. The reference teaches the range of viscosity numbers to be "from 10 to 1000 ml/g," shown at column 11 (lines 53-56) which is entirely within that recited in claims 3 and 14. Other polymers, including polyethylene, polypropylene and other olefin (co)polymers, are shown at column 14 (lines 4-23), as recited in claim 8.

Since the compositions produced in accordance with Jacobs et al, and subsequently employed in the manufacture of films of "any shape and size" by thermoforming, are identical as to monomers, content thereof, comonomers and their contents, having high water vapor resistance and embracing glass transition temperature values, the recitations regarding the temperature of thermoforming and the particular heat distortion temperature range would be inherent.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jacobs et al (US 6,365,686), as applied to claims 1-3, 5-9, 13, 14, 16 and 17 above, and further in view of Yamamoto et al (US 5,783,273) or Hirose et al (US 5,321,030), both newly cited.

The reference to Jacobs et al teaches the production of cyclic olefin copolymers useful in the manufacture of films using identical constituents that produce copolymers having identical physical characteristics and may be used as a blend with other polymers, as recited and claimed herein. The reference does not provide any range for the film thickness as recited in claims 4 and 15, but states that the composition is employed to produce films or sheets "of any shape and size." The reference does not provide any teaching of ranges for the heat distortion temperatures as recited in claims 10, 12 and 18, though the reference teaches a "high glass transition temperature, "associated with a high heat distortion resistance," as pointed out above. Based on the teachings of the reference, as pointed out, the manipulation of film thickness would have been within the skill of an artisan depending on end-use. This is bolstered by the fact that the instantly claimed films may be as thick as 2 mm (2000 μm), or about 0.078 inches. The reference shows the high cyclic monomer content, making the high Tg values and associated heat distortion resistance expected, and not surprising results.

The reference does not show the manufacture of a blister pack, as recited in claim 11.

The references to Yamamoto et al (US 5,783,273) and Hirose et al are both relied upon to show the production of films having the specified thickness employed to form blister packs, as recited in claim 11.

Yamamoto et al show the production of multilayer laminates, suitable to produce blister packs. Note the Abstract. The reference employs the identical monomers as herein claimed. Note column 43 (lines 42-48) which shows a thickness of 150-5,000 μm, clearly within the ranges recited in claims 4 and 15. The reference employs the identical monomers, as herein recited and as taught by Jacobs et al, at column 5 (lines 1 et seq.). The reference shows a glass transition temperature of 30° - 180°C at column 30 (lines 28-36). This high range would also be indicative of a high heat distortion resistance, as recited herein.

The patent to Hirose et al shows the manufacture of multilayer laminates, suitable for the production of blister packs, whose film thickness may be "in the range of 2 μm to 20 mm," which embraces the recitations of claims 4 and 15. Note the Abstract. The reference employs the identical monomers used by Jacobs et al and employed herein. Note column 5 (lines 1 et seq.). The reference teaches a glass transition temperature range of "preferably -10° - 170°C" at column 3 (lines 59-63).

The secondary references and the primary reference to Jacobs et al all show the use of the identical monomers. Each shows the production of films. Yamamoto et al and Hirose et al show the specific film thickness range and subsequent use thereof in the production of blister packs. Nothing on the record indicates unexpected or surprising results.

Claims 1-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jacobs et al (US 6,316,560), as applied to claims 1-3, 5-9, 13, 14, 16 and 17 above, and further in view of Yamamoto et al (US 5,783,273) or Hirose et al (US 5,321,030).

The reference to Jacobs et al teaches the production of cyclic olefin copolymers useful in the manufacture of films using identical constituents that produce copolymers having identical physical characteristics and may be used as a blend with other polymers, as recited and claimed herein. The reference does not provide any range for the film thickness as recited in claims 4 and 15, but states that the composition is employed to produce films or sheets "of any shape and size." The reference does not provide any teaching of ranges for the heat distortion temperatures as recited in claims 10, 12 and 18, though the reference teaches a "high glass transition temperature, "associated with a high heat distortion resistance," as pointed out above. Based on the teachings of the reference, as pointed out, the manipulation of film thickness would have been within the skill of an artisan depending on end-use. This is bolstered by the fact that the instantly claimed films may be as thick as 2 mm (2000 μm), or about 0.078 inches. The reference shows the high cyclic monomer content, making the high Tg values and associated heat distortion resistance expected, and not surprising results.

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The references to Yamamoto et al (US 5,783,273) and Hirose et al are both relied upon to show the production of films having the specified thickness employed to form blister packs, as recited in claim 11.

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The patent to Hirose et al shows the manufacture of multilayer laminates, suitable for the production of blister packs, whose film thickness may be "in the range of 2 μm to 20 mm," which embraces the recitations of claims 4 and 15. Note the Abstract. The reference employs the identical monomers used by Jacobs et al and employed herein. Note column 5 (lines 1 et seq.). The reference teaches a glass transition temperature range of "preferably -10° - 170°C" at column 3 (lines 59-63).

The secondary references and the primary reference to Jacobs et al all show the use of the identical monomers. Each shows the production of films. Yamamoto et al and Hirose et al show the specific film thickness range and subsequent use thereof in the production of blister packs. Nothing on the record indicates unexpected or surprising results.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Nathan M. Nutter whose telephone number is 571-272-1076. The examiner can normally be reached on 9:30 a.m.-6:00 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, James J. Seidleck can be reached on 571-272-1078. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Nathan M. Nutter
Primary Examiner
Art Unit 1711

nmn

10 September 2007